DOCUMENT RESUME

ED 085 487 CE 000 567

AUTHOR Stitt, Thomas R.
TITLE A Pre-Service Program in Environmental Occupations.
INSTITUTION Illinois State Board of Vocational Education and Rehabilitation, Springfield. Div. of Vocational and Technical Education.; Southern Illinois Univ., Carbondale. Dept. of Agricultural Industries.
PUB DATE [73]
NOTE 35p.; See also CE 000 565 and CE 000 566

EDRS PRICE MF-$0.65 HC-$3.29
DESCRIPTORS Career Education; Curriculum Design; Educational Programs; Environment; *Environmental Education; *Internship Programs; Occupational Information; *Teacher Education

ABSTRACT

The Pre-Service Program in Environmental Occupations began in September 1972 and was completed in September 1973. The primary objectives of the program phase were to design and structure an environmental occupations teacher education program and internship experience and to recruit initial prospective teachers to participate in the experience. The objectives of the training phase included selecting five participants, enrolling them in the program, and supervising them throughout their internships. The procedures were somewhat complicated by the fact that both phases occurred simultaneously. Nevertheless, it was possible to design, through a seminar program, a curriculum and appropriate experiences to equip the participants with the competencies needed for occupational education in the area of environment. The project has fostered greater interest in career education in environmental occupations and has resulted in information and materials useful for later projects and studies in this area. (Author/MS)

A PRE-SERVICE PROGRAM IN ENVIRONMENTAL OCCUPATIONS

Directed by THOMAS R. STITT

Department of Agricultural Industries
Southern Illinois University at Carbondale

U S DEPARTMENT OF HEALTH
EDUCATION & WELFARE
NATIONAL INSTITUTE OF
EDUCATION
THIS DOCUMENT HAS BEEN REPRODUCED EXACTLY AS RECEIVED FROM THE PERSON OR ORGANIZATION ORIGINATING IT. POINTS OF VIEW OR OPINIONS STATED DO NOT NECESSARILY REPRESENT OFFICIAL NATIONAL INSTITUTE OF EDUCATION POSITION OR POLICY

in cooperation with the Illinois Division of Vocational and Technical Education

ED 085487

CE 000 567

FILMED FROM BEST AVAILABLE COPY

ED 085487

FINAL REPORT

Contract Nos. MP 3a-P5a
MP 3b-P5a

PRE-SERVICE PROGRAM IN ENVIRONMENTAL OCCUPATIONS

A Project to Design and Structure a Pre-Service Environmental Teacher Education Curriculum Program and Internship Training Experience

by

Thomas R. Stitt, Director
Agricultural Industries Department
Southern Illinois University
Carbondale, Illinois 62901

THE PRE-SERVICE PROGRAM IN ENVIRONMENTAL OCCUPATIONS (PROGRAM PHASE) was conducted in conjunction with the PRE-SERVICE PROGRAM IN ENVIRONMENTAL OCCUPATIONS (TRAINING PHASE) according to dual contracts with the Professional and Curriculum Development Unit, Division of Vocational and Technical Education, Board of Vocational Education and Rehabilitation, State of Illinois.

Southern Illinois
University

CARBONDALE, ILLINOIS 62901

Department of Agricultural Industries

Mr. Sherwood Dees, Director
Division of Vocational and
Technical Education
1035 Outer Park Drive
Springfield, Illinois 62706

Dear Mr. Dees:

I respectfully submit this final report of the Pre-Service Program in Environmental Occupations to you.

It is my hope that the methods and recommendations this report reveals will be a guide to those individuals interested in preparing vocational teachers to teach environmental occupations.

Sincerely,

Thomas R. Stitt
Project Director

PREFACE

This report is the result of dual research project contracts conducted at Southern Illinois University--Carbondale, under two separate but simultaneous and related grants from the Professional and Curriculum Development Unit, Division of Vocational and Technical Education, Board of Vocational Education and Rehabilitation. The departments of Agricultural Industries, Home Economics Education, Occupational Education, Student Work and Financial Assistance, and the College of Careers participated in the form of representatives to the project Teacher Education Committee.

The following report is presented in an informal, chronological fashion in hopes that Illinois teacher education personnel will find it convenient to consider and incorporate aspects of the program developed here. Since specific policies and regulations of the various departments at SIU, Carbondale, had to be followed, others in the state may find it necessary to make appropriate changes in procedure to fit their particular situation.

ACKNOWLEDGEMENTS

A pre-service training program such as this one is only as successful as the people involved in it desire it to be and are willing to invest of their time and talent. Cooperation was necessary on both the state and local levels. The recommendations and assistance of Dr. Richard Hofstrand, Head Consultant of the Professional and Curriculum Development Unit of the Illinois Division of Vocational and Technical Education were invaluable. Dr. Eugene Wood, Chairman of Agricultural Industries Department, allowed flexibility in teaching assignments and scheduling which was critical to the seminar instruction and supervision of internships.

My thanks go also to Bill Applegate, Liaison Officer, for his coordination and support and to the Teacher Education Committee for their guidance and assistance throughout the project. Special appreciation goes to Frank Adams, Director of Student Work and Financial Assistance for supplying the resources to support an additional participant beyond the contract requirements.

I am appreciative of the cooperation and hospitality extended to us by the Task Force staff and the sister institution staff at Chicago State University.

The real acknowledgement has to go to the six participants in the project. The program was designed for them and it is they who really benefited from it. Regardless of all the cooperation and support of all the other people involved, only with the participants and their willingness to work were we able to accomplish such an outstanding educational program and internship experience.

TABLE OF CONTENTS

Letter of Transmittal ii

Preface iii

Acknowledgements iv

Table of Contents v

List of Figures vi

List of Appendices vii

Abstract viii

Chapter I Purpose 1

Chapter II Program and Training Phases 3

Chapter III Recommendations 16

Appendices 19

LIST OF FIGURES

Figure 1	Promotional Flyer
Figure 2	Letter Requesting Information
Figure 3	Occupational Matrix
Figure 4	Occupational Information Summary Sheet
Figure 5	Competency Identification and Analysis Worksheet

LIST OF APPENDICES

APPENDIX A Environmental Occupations Teacher Education Committee

APPENDIX B Participant Data

APPENDIX C Environmental Publications

APPENDIX D Publicity Releases

ABSTRACT

The Pre-Service Program in Environmental Occupations began in September, 1972, and was completed in September, 1973. The primary objectives of the program phase were to design and structure an environmental occupations teacher education program and internship experience and recruit initial prospective teachers to participate in the experience. The objectives of the training phase included selecting five participants, enrolling them in the program, and supervising them throughout their internships.

The procedures were somewhat complicated by the fact that both the program phase and training phase occurred simultaneously. Nevertheless, it was possible to design through a seminar program a curriculum and appropriate experiences to equip participants with the competencies needed for occupational education in the area of environment.

At the completion of the project we find six vocational teachers with a curriculum and internship experience unique in Illinois education. The project has fostered greater interest in career education in environmental occupations and has resulted in information and materials useful for later projects and studies in this current and vital area.

CHAPTER ONE

PURPOSE

The environment and its maintenance, long the responsibilities of a selected few, have in recent years become national and state issues. The Environmental Protection Act of Illinois has potential for long range and meaningful impact on employment opportunities with business, industry, education, and government encompassing air pollution, water pollution, public water supplies, land pollution and refuse disposal, noise, and atomic radiation. Schools and colleges offer few training programs which prepare individuals to find employment in these environment-related occupations which never existed before or which evolved from existing occupations. This program deficiency is due to the lack of identified and defined occupations and a resulting lack of competent instructional personnel capable of training individuals in environmental occupations.

The Pre-Service Environmental Occupations Program was begun in September, 1972, and completed in September, 1973, with the purpose of building on the FY-72 Task Force Report to fill the above deficiencies. The program consisted of two related projects funded separately but running simultaneously as one activity. The anticipated outcomes of the total program were:

1. to design and structure a pre-service environmental occupation education curriculum and internship experience.
2. to recruit initial perspective participants.
3. to enroll participants and begin the educational program.
4. to supervise participants throughout the internship program.

The procedures for structuring the educational program consisted of a pilot project in which the established Environmental Occupations Teacher Education Committee investigated all possible avenues based on the Environmental Task Force Report and current literature and piloted the most logical approach to train perspective environmental occupations teachers. This approach included determining environmental occupational competency clusters, designing curricula and related work experience for preparing teachers, and implementing curricula and experiences for selected students.

CHAPTER TWO

PROGRAM AND TRAINING PHASES

The following is a chronological summary of the activities as they were initiated to prepare future vocational teachers to teach environmental occupations. Some activities were short-term or one-time endeavors while others continued for the duration of the project. These differences are noted where appropriate. The summary includes organization procedures, program development, and internship activities.

ORGANIZATION

1. Funding

Both the program and training phases began September 1, 1972, and were to be completed in June and August, 1973, respectively. The program phase later received a 60-day extension to allow incorporating the results of the internship experience in this report.

2. Staff

An assistant project director was appointed and procedures for recruiting five participants were implemented. The various department heads were contacted and asked to inform their students of the program and recommend any students they felt would be interested in such a program. In addition, a promotional flyer was circulated throughout the campus by means of department personnel and bulletin boards. (Figure 1) The response was limited. It is felt that the recruitment process was exceedingly difficult because of the late project starting date. By the time potential participants were informed of the opportunity, they were already scheduled into fall study programs.

Juniors & Seniors Interested in Ecology

If you are a junior or a senior interested in environment and are willing to prepare for teaching in career areas in secondary education, you may have the opportunity of participating in a special environmental training program.

Selected participants will receive academic training and practical work experience in environmental maintenance occupations through special seminars during the Winter, Spring, and Summer quarters of 1973. These participants will receive on-the-job internships in business, industry, labor, or government and will be prepared to teach environmental maintenance in addition to being certified to teach in their current special field. This training may prove invaluable as schools begin to seek teachers and trainers in this relatively new field of education.

Participants will receive a fee waiver, a partial stipend, and university course credit while enrolled in the program. If this program interests you,

Contact: THOMAS STITT, AGRICULTURAL INDUSTRIES
SIU. 453-2421

(Figure 1)

3. Task Force Report

The Environmental Task Force Report was reviewed upon receipt. The nature of the report indicated further research needs which are explained later.

4. Teacher Education Committee

A teacher education committee was established during the Fall Quarter, 1972. The core of the committee was drawn from Teacher Education and drew its initial inertia from the Environmental Task Force and worked closely with that unit as it undertook Task Force FY-73 assignment, that of "identification and development of strategies which prepare teachers to train individuals for occupations in environmental maintenance." The committee membership is listed in Appendix A. Liaison with the committee continued throughout the project period including an orientation meeting in November followed by several meetings through early January in which qualifications, applications, and interviews of participants were formulated, selected, and conducted. The committee contribution was a valuable part of the project. In fact, through one member of the committee, Frank Adams, Director of Student Work and Financial Assistance, additional money was put up beyond the SIU contract contribution to permit a sixth participant to join the project team.

5. Task Force Liaison

Liaison was established with Alvin R. Jacobson of the FY-73 Environment Task Force on October 23, 1972, at Illinois State University. This contact continued throughout the duration of the project including the May 30 meeting in Normal. Revision, augmentation, and updating of the Task Force

Report, the base tool of the pre-service project, constituted the bulk of the activities at the formal meetings.

6. Cooperating Institution Liaison

Liaison was established initially on October 9, 1972, with Sheadrick Tillman, Occupational Coordinator at Chicago State University, the cooperating institution. This contact was renewed December 5 and 6 in Chicago at the directors meeting and continued with Lindy Solon, director of the sister pre-service project at Chicago State University throughout the duration of the contract. That liaison has adhered beyond the project perimeters by continuing into another DVTE project, Occupational Teachers Workshops on Existing and Emerging Environmental Occupations.

PROGRAM DEVELOPMENT

After these organizational requirements had been met, it was possible to begin developing the educational program. Attempts were made by mail late in October to discover what curriculum materials, course outlines, and staff responsibility existed in departments in 82 colleges (Figure 2). Responses indicated that they were in the same position we were. Consequently, the results of the request were not helpful.

7. Enroll Participants (First Quarter)

After requesting names of potential participants from Deans and Department Chairmen and using all available media for promoting the program, the staff screened applications and interviewed students. The final selection of participants was accomplished with the aid of the Teacher Education Committee. Those chosen were representative of a wide variety of interests including textiles, social work, agriculture, health, home economics, and

Southern Illinois
University

CARBONDALE, ILLINOIS 62901

Department of Agricultural Industries

October 30, 1972

TO: Head of Agriculture Education Department

FROM: Dr. Thomas R. Stitt, Agricultural Education
Project Director
Ms. Beverly Hendee, Assistant Project Director
Pre-Service Environmental Project-Training
Phase - Program Phase.

RE: Ecological, Environmental Training Programs

We are currently conducting a State of Illinois, Division of Vocational and Technical Education funded project focused on the Pre-Service Training Program in Environment for Vocational Teachers. The project training includes both formal structured courses and the supervised internship program.

One of the major problems we are currently facing is the development of the curriculum and the construction of specific courses designed for prospective vocational teacher educators. As a result of current emphasis by E.P.A., I am sure many of you have or are currently facing this problem at the department, school, college or university level.

You could be of valuable assistance if you would provide us with information related to or copies of the following:

1. Curriculum for vocational teachers who are specializing in environment and its related areas.

2. Detailed course outlines for new courses which have been specifically developed and/or are being developed for inclusion in an environmental curriculum.

3. The departmental or school staff member who is directing this phase of your program.

Thank you for your cooperation.

Figure 2

enterprise. Detailed information concerning each participant is included in Appendix B.

Because the nature of the Task Force Report did not lend itself to individual study and since literally no curriculum materials were available from the land grant colleges, the participants began the program by building a reading bibliography of all areas of environment to serve as resource material for later seminar study and publication for resource material. This endeavor resulted in the annotated bibliography that was published at the conclusion of the seminar program. Based on these readings, it became apparent that other resource materials were necessary to the successful understanding of environmental study. So, during this quarter, initial steps were taken toward developing the remaining publication readied at the end of the project: the environmental glossary, job analysis study, and audio-visual guide. A list of the resulting publications is found in Appendix C.

8. Enroll Participants (Second Quarter)

During the second quarter, the participants chose sections of a specially designed matrix made up of the occupational clusters in each EPA bracket at each job competency level (Figure 3). They were to discover what they could about as many occupations that existed and determine where occupations were just emerging. They used specially designed forms to record their findings. (Figures 4 and 5). In their reading the participants discovered many words they were not familiar with. It became evident that to understand environmental studies, familiarity with these terms were desireable. Therefore, the participants began to collect definitions to include in an

E. .... BI...ET

Cluster	General Orientation	Air	Water	Public Water Supply	Land Pollution And Refuse	Noise	Atomic Radiation
Applied Biological And Agricultural Occupations 01.0000							
Business, Marketing, and Management Occupations 04.0000							
Health Occupations 07.0000							
Industrial-Oriented Occupations 17.0000							
Personal & Public Service Occupations 01.-04.0000 07.-09.0000							

LEVEL

- Professional and Management
- Technical
- Skilled
- Semi-Skilled
- Unskilled

Figure 3

OCCUPATIONAL INFORMATION
Summary Sheet

Prepared By _____ Date _____

Cluster: _____

LEVEL: _____

E.P.A. Bracket: _____

Job Title: _____

DOT Number _____ Est. Salary Level _____

DUTIES AND RESPONSIBILITIES:

SPECIAL KNOWLEDGE:

SPECIAL SKILLS:

TEACHING REFERENCES:

Figure 4

COMPETENCY IDENTIFICATION AND ANALYSIS WORKSHEET

Prepared by: _____ Date: _____ Job Title: _____ DOT. No. _____

Cluster _____ Level _____ E.P.A. Bracket _____

Column A	Column B		Column C								Column D	Column E
Competency Statement	Frequency of Performance		Importance								Conditions for Application of Competency	Criteria That Exhibit Satisfactory Application of the Competency
	Every Day Frequently Rarely	No. of Times Per Week, Day, Year or Month	For Job Entry				For Job Advancement					
			E	D	U	NS	E	D	U	NS		

E - Essential; D - Desirable; U - Unnecessary; NS - Not Sure

Reprint with modification from Illinois Occupational Curriculum Project, Joliet Jr. College
DVTE

Figure 5

environmental glossary. They also located, reviewed, and evaluated environmental curriculum guides and instructional materials and formulated a resource listing of useful aides. The reading bibliography was expanded and organized according to EPA brackets and occupational clusters. They also searched college catalogs of course offerings and interviewed department heads in an effort to find and describe all courses that were offered on the campus that would be valuable for an environmental occupations teacher. They used the following guide in their search:

School:

Department:

Course Title:

Course No.:

Credit Hours:

Prerequisites:

% time (in class) devoted to environmental problems and their solutions:

Brief description of course:

9. Determine Participants' Needs

During the seminar program the participants' previous experience and educational needs were determined as a base for planning future training experiences.

10. Identify and Enroll Participants in Existing Courses

The participants were enrolled in those courses which were found to meet their individual needs in terms of their areas of special interest. But courses that pertained directly to environmental problems and occupations were difficult to find and selection was limited.

11. Identify Needed Courses

Because of the difficulties encountered in enrolling in environmental courses, participants unable to satisfy educational needs in existing courses were directed to special curriculum materials and readings for individual study. It was necessary to custom tailor a program for each participant because of career choices, experiences, and interests.

INTERNSHIP EXPERIENCE

12. Structure Internship

The internship required was identified based on the participants' experiences and needs in seminars during the Spring Quarter, 1973. Their previous experience and their future plans in terms of career goals dictated the quality and quantity of their individual internships.

13. Identify Staff

Arrangements were made for the project director to supervise the internship activities. Advisory staff of each participant's department were kept informed of the experiences of the students by means of informal and formal reporting.

14. Identify Training Stations

The participants located and sought approval of their training stations for their internships. While they were out making on-the-spot job analyses for seminar study and toward publication of an employment opportunities guide, they were actively involved in locating possible training stations for their internships. For example, one participant found a suitable training station at Little Grassy Camp while interviewing the camp director in an attempt to identify competencies for that position. Each participant got a close look at many businesses and industries and at all competency

levels in each occupational cluster. This experience proved invaluable in choosing a desirable training station. The diversity of the resulting internships are as follows: The Applied Biological and Agricultural Occupations major had an internship teaching ecology to urban youth in a summer camp. The Health Education major had an internship in Water and Waste Disposal. The two Home Economics Education majors taught--one, Conservation and Ecology in a youth camp, and the other, working with solid waste disposal in recreational facilities while considering nutritional requirements for those at the facilities. The Occupational Education major formulated a glass recycling enterprise system at the secondary level.

15. Training Agreement

Various opportunities came up while determining the training stations to discuss appropriate organization of the internships that suited the participant, the business establishment, and the project director. Training agreements for the participants and the training stations were prepared and accepted in June, 1973.

16. Enroll Participants

The participants were enrolled and placed in the internship program for credit in June, 1973. They returned to the director's office several times on an individual basis to discuss their enrollment and any special problems or successes they were experiencing.

17. Supervise Participants

Participants were personally supervised by the project director several times during their summer intern experience. During these encounters the director met with both the participant and his superior to learn the content of the training and the values gained on both sides.

18. Evaluate Experience

Because of the close proximity of the training posts, a monthly seminar was determined to be the best method of evaluating and sharing experiences rather than a concentrated seminar at the end of the program. In addition to the monthly seminars, participants met with the project director individually throughout the summer.

CHAPTER THREE

RECOMMENDATIONS

Sub-project MP-3b-P5a Pre-Service Program in Environmental Maintenance (Training Phase) had as its RFP Goal "To recruit and enroll five students in the pre-service environmental teacher education program."

Results: With the funds allocated by the project, five participants were funded and the sixth was funded by the Student Work and Financial Assistance of SIU/C. All participants followed the training activities outlined in the previous chapter. As this report goes to press, the after the project participant activities include: Douglas Patton--Applied Biological and Agricultural Teacher at Litchfield, Illinois. Douglas will be teaching a series of units which he helped write and field test as part of his internship program.

Julie Berg is continuing her formal education and work on qualifying as a water waste disposal technician.

Mary Wietting and Kay Wafer are both student teaching and have assignments in which they will be teaching some of the units which they prepared and field tested during their internship.

Roy Swanson is student teaching and field testing the glass recycling program which was developed as part of his internship.

Janice Edwards is completing her last quarter and preparing to return to the same general area of Chicago pursuing a job not unlike her internship.

All of the participants are continuing their affiliations and activities which were implemented during the program. All will be in a teaching position or the role of a change agent. All have or are pursuing employment which will provide continued opportunity to work in the environmental area.

Sub-project MP-3a Pre-Service Program in Environmental Maintenance (Program Phase) had as its RFP Goal "To utilize the finding of the task force to design and implement a pilot instructional personnel development program in environmental science occupation."

Results: As a "pilot instructional personnel development program" the six participants mentioned above were trained. Although each effort was a custom tailored program and the time frame was short, limiting flexibility and innovative activities, it is the judgment of the project staff that such a program has been effective. The project director is currently in the process of implementing an "Environmental" option as one of the regular options of the Applied Biological and Agricultural Occupations at SIU/C. With the increased time frame available for regular students, the knowledge gained on program development and internship options in the environmental areas, it will be possible to produce a strong program for Applied Biological and Agricultural Occupations majors with environmental interest.

The program development effort will continue with the cooperation of all interested departments at SIU/C and the support of Mr. Appelgate's office to develop an Environmental Option for all vocational majors.

In addition to the two projects' objectives which were accomplished there were several fringe benefits which although they are by-products, are extremely valuable. Some have been discussed in Chapter II and only a review of the major ones will be mentioned. They are as follows:

1. Staff from the Chicago State project and the State Task Force are working cooperative on the next phase, Occupational Teachers Workshops on Existing and Emerging Occupations, a DVTE funded project.

2. A sixth SIU/C supported participant was trained exactly as the other five participants.

3. Graduate student Kermit Bohning became interested in the project's topic. Although not funded by the project, he worked closely with the participants, and his thesis and subsequent publication are available for the teachers of Illinois. Publication Bohning and Stitt, Teaching Materials for Environmental Related Courses in Agricultural Occupations Programs, Department of Agriculture Industries, Series No. 101, Southern Illinois University, Carbondale, Illinois.

Four project publications include:

An Annotated Bibliography for Environmental Educators, by Dr. T. R. Stitt & Project Staff.

An Environmental Glossary for Environmental Educators, by Dr. T. R. Stitt & Project Staff.

Employment Opportunity and Job Analysis for Selected Environmental Occupations, by Dr. T. R. Stitt & Project Staff.

Review of Audio-Visual Materials for Environmental Educators, by Dr. T. R. Stitt & Project Staff.

APPENDIX A

Environmental Occupations Teacher Education Committee

Dr. Frank Adams, Director of Student Work and Financial Assistance

Dr. William Appelgate, Coordinator of Vocational and Technical Education

Dr. Anna Carol Fults, Chairman of Home Economics Education

Mr. Richard Hofstrand, DVTE

Mr. Jack Huck, Occupational Education

Dr. Arden Pratt, Dean of the College of Careers

APPENDIX B

Participant Data

Julie Berg

Julie is from Brookfield, Illinois, and is majoring in General Agriculture at Southern Illinois University. Her professional objective is to work in the field of Agriculture.

Janice Edwards

Janice is from Chicago, Illinois, and is majoring in Family Management in Home Economic . She plans to work with the Home and Family Services in Chicago upon graduation.

Douglas Patton

Doug is from Elizabethtown, Illinois, and is majoring in Agricultural Education. His student teaching experience enabled him to teach an environmental course at the high school level. He plans to teach Agriculture in high school with emphasis on environment.

Wally Swanson

Wally is from Olympia Fields, Illinois, and is majoring in Enterprise at Southern Illinois University. He plans to become an enterprise teacher upon graduation with emphasis on environment, i.e., glass recycling.

Kay Wafer

Kay is from Carterville, Illinois, and is majoring in Home Economics Education. She plans to incorporate her environmental training into teaching home economics at the high school level.

Mary Wietting

Mary is from Monmouth, Illinois, and has a B.S. degree from Southern Illinois University in Clothing and Textiles and is currently completing a Teacher Certification degree in Home Economics Education. Her objective is to teach Home Economics in high school including a series of units on environment and the homemaker.

APPENDIX C

Environmental Publications

1. AN ANNOTATED BIBLIOGRAPHY FOR ENVIRONMENTAL EDUCATORS

   Composites of readings by the project participants.

2. AN ENVIRONMENTAL GLOSSARY FOR ENVIRONMENTAL EDUCATORS

   Selected environmental terms and definitions most commonly confronted by the participants in their readings and research.

3. REVIEW OF AUDIO-VISUAL MATERIALS FOR ENVIRONMENTAL EDUCATORS

   An abbreviated list of audio-visual materials identified and reviewed by the participants.

4. EMPLOYMENT OPPORTUNITY AND JOB ANALYSIS FOR SELECTED ENVIRONMENTAL OCCUPATIONS

   A collection of jobs identified and described by the participants. Selected environmental job titles drawn from the survey of jobs analyzed in detail through library research and by interviews.

APPENDIX D

Publicity Releases

9-29-72
University News Service
SOUTHERN ILLINOIS UNIVERSITY AT CARBONDALE
Carbondale, Illinois 62901
Phone: (618) 453-2276

CARBONDALE, ILL., Sept. -- Two state grants to Southern Illinois University at Carbondale, amounting to $13,329, have been approved to help fund a two-phase study of "pre-service training in environment" by Thomas R. Stitt, SIU associate Professor of agricultural industries.

The first part of the study will be concerned with the program phase and the second part with the training phase of the pre-service training project. The first part is scheduled for completion by the end of next June and the other by the end of August, 1973. The grants are from the Division of Vocational and Technical Education of the Illinois Board of Vocational Education and Rehabilitation.

Stitt says the studies will be concerned with developing a related program of study for students preparing for agricultural occupations teaching to provide a knowledge of jobs related to maintaining the environment.

-am-

Published in VAS-AIDS--September 1973

Projects Funded: Dr. Thomas R. Stitt, Associate Professor of Agricultural Industries, Southern Illinois University/Carbondale has had two projects funded. The Professional and Curriculum Development Unit, Division of Vocational and Technical Education, Board of Vocational Education and Rehabilitation, funded the projects.

MP-3a - Pre-Service Program in Environmental Maintenance (Program Phase) was funded from September 1, 1972 to June 30, 1973. The project is designed to explore curricula development for Career Educators at the High School and Post-High School level in Environment.

MP-3a-5a - Pre-Service Training in Environmental Maintenance (Training Phase) was funded from September 1, 1972, to June 30, 1973. This project is designed to recruit five students desiring a major in vocational education for orientation and training of problems related to the environment.

Both projects are pilot programs and resources from industry, governmental agencies and individuals will be secured.

Teachers of Agriculture who are currently or in the near future planning to teach a course related to this area are encouraged to complete the attached tear sheet and return to:

Dr. Thomas R. Stitt
Agricultural Industries Department
Southern Illinois University
Carbondale, Illinois 62901

- -

Name _____

School Address _____

Title of Environmental Related course planned:

_____

_____ Grade Level _____

Title of Environmental Related course currently taught:

_____

_____ Grade Level _____

Published in VAS-AIDS

NEWS FROM SOUTHERN ILLINOIS UNIVERSITY

Pilot Program

Dr. Thomas R. Stitt, associate professor of Agricultural Education at S.I.U., is directing two pilot programs in (1) Pre-Service program in Environmental Maintenance and (2) Pre-Service Training in Environmental Maintenance. The pilot programs, that started on September 1, 1972, are scheduled to end on June 30, 1972, are a result of a funded project that Dr. Stitt obtained through the Illinois Professional and Curriculum Development Unit, Board of Vocational Education and Rehabilitation.